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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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Hiroyuki Iida

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EXAMINER

KAYRISH, MATTHEW

ART UNIT

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**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

<b>Office Action Summary</b>	<b>Application No.</b> 10/802,868	<b>Applicant(s)</b> IIDA, HIROYUKI	
	<b>Examiner</b> MATTHEW G. KAYRISH	<b>Art Unit</b> 2627	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 07 July 2008.
- 2a) ☒ This action is **FINAL**.                      2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-11 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-11 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)                     | 4) <input type="checkbox"/> Interview Summary (PTO-413)           |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____                                      |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)          | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____  | 6) <input type="checkbox"/> Other: _____                          |



### **DETAILED ACTION**

1. No claims have been amended. Claims 1-11 remain pending.

### ***Response to Arguments***

2. Applicant's arguments filed 7/7/2008 have been fully considered but they are not persuasive.

Applicant contends that the combination of Kasajima and Ito, as proposed in the previous non-final rejection would not have been obvious to one of ordinary skill in the art at the time the invention was made because Ito and the present invention perform different functions. Specifically, the applicant uses a slider to suppress exudation of the pressure-sensitive adhesive from the pores of the porous sheet, while Ito improves the wear resistance of the slider by using a plastic material that is impregnated with oil, perfluoropolyether. Accordingly, the head alleviates crushing and stabilizes the extent of flotation and generates little noise. It is noted that these features are not recited in the rejected claims. Although the claims are interpreted in light of the specification, limitations from the specification are not read into the claims. See *In re Van Geuns*, 988 F.2d 1181, 26 USPQ2d 1057 (Fed. Cir. 1993). In this case, claim 1 of the present application makes no mention of a slider to resist exudation. Secondly, even if it did, Kasajima is the primary reference used for the rejection and already discloses this. Thus the arguments are irrelevant because the primary reference teaches the motivation for the applicant's arguments. Furthermore, the fact that applicant has recognized another advantage which would flow naturally from following the suggestion

of the prior art cannot be the basis for patentability when the differences would otherwise be obvious. See *Ex parte Obiaya*, 227 USPQ 58, 60 (Bd. Pat. App. & Inter. 1985). In this case, the slider of Ito alleviates crushing and stabilizes the extent of flotation and generates little noise which is another advantage that naturally flows from the invention and is not a means for establishing patentability.

Applicant further contends that Ito is insufficient for curing the deficiencies of Kasajima because Ito fails to disclose a pressure sensitive adhesive on one side of the substrate. This argument is not found persuasive because the primary reference, Kasajima, teaches a pressure sensitive adhesive as presented in the previous non-final rejection and relies on Ito to disclose that a porous plastic slider can have been used. Thus this argument is irrelevant for failing to acknowledge Kasajima's recitation of the pressure sensitive adhesive.

Applicant further contends that Ito teaches away from the examiner's combination because Ito uses a low-molecular weight component that exudes to the surface of the plastic material, in a phenomenon known as blooming. This is not found persuasive because one cannot show nonobviousness by attacking references individually where the rejections are based on combinations of references. See *In re Keller*, 642 F.2d 413, 208 USPQ 871 (CCPA 1981); *In re Merck & Co.*, 800 F.2d 1091, 231 USPQ 375 (Fed. Cir. 1986). Specifically, the applicant continuously attacks Ito for the use oil to increase the slidability of the slider. In this case, as noted above, Kasajima relies on Ito solely for the reason of a porous slidable substrate. Kasajima

does not teach exudation or the use of oil, and thus the preceeding argument is irrelevant.

Applicant contends that dependent claims 1-4, 6 and 9-11 are allowable as being dependent on claim 1. For the reasons presented by the examiner above, these arguments are not persuasive.

***Claim Rejections - 35 USC § 103***

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 1, 2, 6 and 9-11 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kasajima et al, in view of Ito et al.

Regarding claim 1, Kasajima discloses:

A sliding member comprising a slidable substrate (figure 12, item 22) and a pressure-sensitive adhesive layer (figure 12, items 26 & 28) provided on one side thereof, and a barrier layer is provided between the slidable substrate and the pressure-sensitive adhesive layer (figure 12, items 21, 27 & 29).

Kasajima fails to specifically disclose:

Wherein the slidable substrate is a porous form comprising a plastic.

Ito discloses:

A sliding member comprising a slidable substrate (figure 1, item 1), wherein the slidable substrate is a porous form comprising a plastic (abstract).

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to manufacture the slider out of a porous plastic, as taught by Ito, because this is use of a known material to produce predictable results well known in the art..

Regarding claim 2, Kasajima and Ito disclose the features of base claim 1, as stated in the 103 rejection above, Kasajima further disclosing:

Wherein the slidable substrate has a coefficient of friction of 0.2 or lower (paragraph 2, slider does not contact disc, therefore, coefficient of friction must be less than 0.2).

Regarding claim 6, Kasajima and Ito disclose the features of base claim 1, as stated in the 103 rejection above, Kasajima further disclosing:

Wherein the barrier layer comprises a thermoplastic resin (paragraph 68, acryl base is thermoplastic).

Regarding claim 9, Kasajima and Ito disclose the features of base claim 1, as stated in the 103 rejection above, Kasajima further disclosing:

Wherein the barrier layer has a thickness of 0.01-0.5 mm (paragraph 66).

Regarding claim 10, Kasajima and Ito disclose the features of base claim 1, as stated in the 103 rejection above, but fail to specifically disclose:

Wherein the barrier layer comprises polyethylene or polypropylene.

However, it is well known to one of ordinary skill in the art at the time the invention was made that polyethylene and polypropylene are both types of plastics, and widely used for many different purposes, therefore, it is a simple substitution of a well known material to yield predictable results. Therefore, claim 10 is rejected official notice.

Regarding claim 11, Kasajima and Ito disclose the features of base claim 1, as stated in the 103 rejection above, and Kasajima further discloses:

Wherein one side of the barrier layer is adjacent to one side of the pressure-sensitive adhesive layer (figure 12, item 21 is adjacent to items 26 & 28) and the other side of the barrier layer is adjacent to one side of the slidable substrate (figure 12, items 27 & 29 are adjacent to the substrate).

5. Claims 3 and 4 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kasajima et al, and Ito et al, as applied to claim 1 above, and further in view of Takahashi (US Patent Number 5657300).

Regarding claim 3, Kasajima and Ito disclose the features of base claim 1, as stated in the 103 rejection above, but fail to specifically disclose:



Wherein the slidable substrate is a porous form comprising an ultrahigh molecular weight polyethylene.

Takahashi discloses:

Wherein the slidable substrate comprises an ultrahigh molecular weight polyethylene (column 19, lines 22-34).

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to manufacture the slider from UHMW-PE, as taught by Takahashi, because this allows for high dimensional accuracy on molding, as stated in column 19, lines 25-27.

Regarding claim 4, Kasajima, Ito and Takahashi disclose the features of base claim 3, as stated in the 103 rejection above, but fail to specifically disclose:

Wherein the ultrahigh molecular weight polyethylene has a molecular weight of 500,000 or higher.

However, it is well known to one of ordinary skill in the art at the time the invention was made, that UHMW-PEs contain extremely long chains, and the molecular weight is usually in the range of 2-6 million. Therefore, claim 4 is rejected official notice.

#### ***Allowable Subject Matter***

6. Claims 5, 7 and 8 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

The following is a statement of reasons for the indication of allowable subject matter:

Claim 5 recites:

Wherein the porous form has a porosity of 20-70%.

Claim 7 recites:

Wherein the thermoplastic resin has a melt viscosity of 5-500 kPa•s.

These limitations, in combination with the limitations of the other claims, are neither anticipated, nor rendered obvious by any prior art of record.

The closest reference, Kasajima et al and Ito et al et al, disclose a slider that is made of plastic and having pores, but the exact porosity of this slider is not disclosed, therefore, this is not obvious. Furthermore, these references do not disclose detail of the barrier layer, therefore, this is not obvious.

### ***Conclusion***

7. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any

extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to MATTHEW G. KAYRISH whose telephone number is (571)272-4220. The examiner can normally be reached on 8am - 5pm M-F.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Andrea Wellington can be reached on 571-272-4483. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>.

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Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

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10/8/2008

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